ELSEVIER

Journal of Electroanalytical Chemistry 440 (1997) 287

JOURNAL OF ELECTROANALYTICAL CHEMISTRY

Author index

Albalat, R. 57
Andreu, R. 51
Aramata, A. 153
Atherton, J.H. 83

Beattie, P.D. 73
Booth, J. 83
Borge, G. 183
Brennan, C.M. 83

Carbajo, J. 51
Carbó, R. 57
Cecília, J. 1
Chen, H.-Y. 239
Claret, J. 57
Coles, R.J. 279
Compton, R.G. 83
Córdoba de Torresi, S.I. 193

Davis, J.J. 279
De la Red, E. 95
Del Pópolo, M. 271
De Paoli, M.-A. 193
Divisek, J. 169
Domínguez, M. 51
Dong, S. 229

Fernãndez, L.A. 183
Filipek, S. 163
Fukuda, T. 153
Furlanetto, F. 131

Gaillard, F. 243
Galceran, J. 1
Gautier-Luneau, I. 145
Gavaghan, D.J. 1
Gazotti Jr., W.A. 193
Girault, H.H. 73
González, J. 111
Guerriero, P. 131

Hambitzer, G. 219
He, Y. 65
Hecht, D. 211
Hill, H.A.O. 279
Hori, Y. 283
Hoshi, N. 283
Huang, J. 35

Iino, M. 125, 251
Ikeda, T. 265
Ion, I. 145
Itagaki, M. 139

Jannini, M.J.D.M. 193
Jastrabík, L. 201
Jaworski, J.S. 163

Kano, K. 265
Kato, K. 265
Kato, M. 283
Kirtikara, K. 259

Lee, H.J. 73
Leiva, E. 271
Lelieur, J.P. 243
Leszczyński, P. 163
Levillain, E. 243
Lin, Z.-H. 173
Long, Y.-T. 239
Luo, J. 173

Madariaga, J.M. 183
Marín, D. 95
Martínez-Ortiz, F. 111
Minoura, H. 41
Molina, A. 111
Moutet, J.-C. 145
Musiani, M. 131

Nakayama, M. 125, 251

Ogura, K. 125, 251
Osborne, M.D. 73

Popescu, A. 145
Puy, J. 1

Roldán, E. 51

Saint-Aman, E. 145
Salvador, J. 1
Sanders, G.H.W. 83
Schmickler, W. 169
Seddon, B.J. 73
Serna, C. 111
Shyu, S.-C. 27
Somasundrum, M. 259
Stassen, I. 219
Steffen, B. 169
Stimming, U. 169
Strehblow, H.-H. 211
Sun, D.-d. 103

Tagaki, M. 139
Tanticharoen, M. 259
Tarasenko, A.A. 201
Tatsumi, H. 265
Teijeiro, C. 95
Tomazeswski, L. 145
Tongta, A. 259

Veluchamy, P. 41

Wang, C.M. 27
Wang, E. 65
Wang, Y. 65
Watanabe, K. 139
Wu, L.-L. 173

Yan, J. 229
Yao, B. 35

Zhang, C. 35
Zhou, X. 35
Zhu, G. 65
Zhuang, Q.-k. 103

ELSEVIER

Journal of Electroanalytical Chemistry 440 (1997) 289–292

JOURNAL OF ELECTROANALYTICAL CHEMISTRY

Subject index

Acidic chloride
Application of a wall jet disk electrode combined with an electrochemical quartz crystal microbalance to the study of the dissolution of copper in acidic chloride media (Itagaki et al.) 139
Activation enthalpy
Rates of the halide ion cleavage from halo-9,10-diphenylanthracene anion radicals in DMF (Jaworski et al.) 163
Adsorption
Electrochemical behaviour of oxocarbons on single crystal platinum electrodes. Part V. Tetrahydroxy-*p*-benzoquinone in 0.5 M sulphuric acid medium (Carbó et al.) 57
Electrochemical scanning tunneling microscopy and electrochemical quartz crystal microbalance study of the adsorption of phenanthraquinone accompanied by an electrochemical redox reaction on the Au electrode (He et al.) 65
Ag
XPS investigations of the electrochemical double layer on silver in alkaline chloride solutions (Hecht, Strehblow) 211
Ag(100)
Electrochemical reduction of CO_2 on single crystal electrodes of silver Ag(111), Ag(100) and Ag(110) (Hoshi et al.) 283
Ag(110)
Electrochemical reduction of CO_2 on single crystal electrodes of silver Ag(111), Ag(100) and Ag(110) (Hoshi et al.) 283
Ag(111)
Electrochemical reduction of CO_2 on single crystal electrodes of silver Ag(111), Ag(100) and Ag(110) (Hoshi et al.) 283
Alkali/alkaline earth metals
Synthesis, electrochemistry and complexation studies of ferrocene crown ethers (Ion et al.) 145
Amalgamation
Cyclic chronopotentiometry with non-linear current–time functions at an SMDEAmalgamation and reversibility effects and experimental verification (González et al.) 111
Amperometric sensor
Amperometric ion sensors based on laser-patterned composite polymer membranes (Lee et al.) 73
Amperometry
A kinetic model for the reduction of enzyme-generated H_2O_2 at a metal-dispersed conducting polymer film (Somasundrum et al.) 259
Analytical equations
Cyclic chronopotentiometry with non-linear current–time functions at an SMDEAmalgamation and reversibility effects and experimental verification (González et al.) 111
Anion
The kinetic study of specific adsorption of phosphate species on Pt(111) in acidic solutions (Fukuda, Aramata) 153
Anion effect
Effect of anions on the electrochemical behavior of Pb electrodes in alkaline solutions and on the anodic oxide film properties (Veluchamy, Minoura) 41
Anionic Fe(II) complex
In situ infrared spectroscopic investigations on the electrochemical properties of Prussian blue–polyaniline-modified electrodes with various anionic Fe(II) complexes working as a mediator for the electroreduction of CO_2 (Nakayama et al.) 251
Anode
Electrochemical deposition and properties of $PbO_2 + Co_3O_4$ composites (Musiani et al.) 131
Anodic oxidation
Effect of anions on the electrochemical behavior of Pb electrodes in alkaline solutions and on the anodic oxide film properties (Veluchamy, Minoura) 41
Anodic oxidation of aniline and *N*-alkylanilines in aqueous sulphuric acid studied by electrochemical thermospray mass spectrometry (Stassen, Hambitzer) 219
Anthracene halides
Rates of the halide ion cleavage from halo-9,10-diphenylanthracene anion radicals in DMF (Jaworski et al.) 163
Antineoplastic drugs
Electrochemical behaviour and micromolar determination of the antineoplastic agent azaribine and its mixtures with cytidine (Marín et al.) 95
Au electrode
Electrochemical scanning tunneling microscopy and electrochemical quartz crystal microbalance study of the adsorption of phenanthraquinone accompanied by an electrochemical redox reaction on the Au electrode (He et al.) 65
Azaribine
Electrochemical behaviour and micromolar determination of the antineoplastic agent azaribine and its mixtures with cytidine (Marín et al.) 95

Bacterial suspension
Mediated catalytic current for the oxidation of ethanol produced by *Acetobacter aceti* cells suspended in solution (Ikeda et al.) 265
Benzoin reduction
Reduction mechanism of benzoin on a mercury electrode (Carbajo et al.) 51
Biosensors
A kinetic model for the reduction of enzyme-generated H_2O_2 at a metal-dispersed conducting polymer film (Somasundrum et al.) 259

Carbon–halogen bond cleavage
Rates of the halide ion cleavage from halo-9,10-diphenylanthracene anion radicals in DMF (Jaworski et al.) 163
Channel flow cell
Mechanism of solid|liquid interfacial reactions. The reactive dissolution of p-chloranil in aqueous solution as studied by the channel flow cell with electrochemical detection and atomic force microscopy (Booth et al.) 83
Characterization
Characterizations of iron-rich clay modified electrodes and their applications in optical recognition (Shyu, Wang) 27
Charge transfer reaction
Cyclic chronopotentiometry with non-linear current–time functions at an SMDEAmalgamation and reversibility effects and experimental verification (González et al.) 111
Chemically modified electrode
Electrochemical regeneration of coenzyme NADH on a histidine modified silver electrode (Long, Chen) 239

p-Chloranil
Mechanism of solid|liquid interfacial reactions. The reactive dissolution of p-chloranil in aqueous solution as studied by the channel flow cell with electrochemical detection and atomic force microscopy (Booth et al.) 83
Choline
Amperometric ion sensors based on laser-patterned composite polymer membranes (Lee et al.) 73
Chronoamperometry
Reduction mechanism of benzoin on a mercury electrode (Carbajo et al.) 51
Clark electrode
Analytical solution for the steady-state diffusion towards an inlaid disc microelectrode in a multi-layered medium (Galceran et al.) 1
CO
Electrochemical reduction of CO_2 on single crystal electrodes of silver Ag(111), Ag(100) and Ag(110) (Hoshi et al.) 283
Concept of reaction layer
The application of the concept of reaction layer to the study of electrode processes coupled with the second-order chemical reactions at microelectrodes under steady-state conditions (Zhuang, Sun) 103
Conducting polymer
A kinetic model for the reduction of enzyme-generated H_2O_2 at a metal-dispersed conducting polymer film (Somasundrum et al.) 259
Conducting polymers
Anodic oxidation of aniline and *N*-alkylanilines in aqueous sulphuric acid studied by electrochemical thermospray mass spectrometry (Stassen, Hambitzer) 219
Conductivity
In situ study of the conductivity of the electrochemically deposited polyaniline film using a dual-disk microelectrode (Zhang et al.) 35
Copper
Application of a wall jet disk electrode combined with an electrochemical quartz crystal microbalance to the study of the dissolution of copper in acidic chloride media (Itagaki et al.) 139
Cyclic chronopotentiometry
Cyclic chronopotentiometry with non-linear current–time functions at an SMDEAmalgamation and reversibility effects and experimental verification (González et al.) 111
Cyclic voltammetry
Electrochemical behaviour of oxocarbons on single crystal platinum electrodes. Part V. Tetrahydroxy-*p*-benzoquinone in 0.5 M sulphuric acid medium (Carbó et al.) 57
Cytidine
Electrochemical behaviour and micromolar determination of the antineoplastic agent azaribine and its mixtures with cytidine (Marín et al.) 95

Deoxybenzoin
Reduction mechanism of benzoin on a mercury electrode (Carbajo et al.) 51
Dimethylformamide
Polysulfides in dimethylformamide: only the redox couples S_n^-/S_n^{2-} are involved (Levillain et al.) 243
Disc electrode
Analytical solution for the steady-state diffusion towards an inlaid disc microelectrode in a multi-layered medium (Galceran et al.) 1
Dissolution
Mechanism of solid|liquid interfacial reactions. The reactive dissolution of p-chloranil in aqueous solution as studied by the channel flow cell with electrochemical detection and atomic force microscopy (Booth et al.) 83
Application of a wall jet disk electrode combined with an electrochemical quartz crystal microbalance to the study of the dissolution of copper in acidic chloride media (Itagaki et al.) 139
Double layer
XPS investigations of the electrochemical double layer on silver in alkaline chloride solutions (Hecht, Strehblow) 211
Dual-disk microelectrode
In situ study of the conductivity of the electrochemically deposited polyaniline film using a dual-disk microelectrode (Zhang et al.) 35
Dual integral equation
Analytical solution for the steady-state diffusion towards an inlaid disc microelectrode in a multi-layered medium (Galceran et al.) 1

ECSTM and EQCM
Electrochemical scanning tunneling microscopy and electrochemical quartz crystal microbalance study of the adsorption of phenanthraquinone accompanied by an electrochemical redox reaction on the Au electrode (He et al.) 65
Electroabsorption
XPS investigations of the electrochemical double layer on silver in alkaline chloride solutions (Hecht, Strehblow) 211
Electrocatalysis
Electrochemical deposition and properties of $PbO_2 + Co_3O_4$ composites (Musiani et al.) 131
Electrochemical regeneration of coenzyme NADH on a histidine modified silver electrode (Long, Chen) 239
Electrocatalytic reduction
A kinetic model for the reduction of enzyme-generated H_2O_2 at a metal-dispersed conducting polymer film (Somasundrum et al.) 259
Electrochemistry
Protein electrochemistry at carbon nanotube electrodes (Davis et al.) 279
Electrochromism
Influence of dopant, pH and potential on the spectral changes of poly(*o*-methoxyaniline): relationship with the redox processes (Gazotti Jr. et al.) 193
Electrodeposition
Electrochemical deposition and properties of $PbO_2 + Co_3O_4$ composites (Musiani et al.) 131
Electroreduction of carbon dioxide
In situ infrared spectroscopic investigations on the electrochemical properties of Prussian blue–polyaniline-modified electrodes with various anionic Fe(II) complexes working as a mediator for the electroreduction of CO_2 (Nakayama et al.) 251
Embedded atom method
Embedded atom method study of Cu deposition on Ag(111) (Del Pópolo, Leiva) 271
EQCM
Application of a wall jet disk electrode combined with an electrochemical quartz crystal microbalance to the study of the dissolution of copper in acidic chloride media (Itagaki et al.) 139
Ethanol
Mediated catalytic current for the oxidation of ethanol produced by *Acetobacter aceti* cells suspended in solution (Ikeda et al.) 265
Excimer laser
Amperometric ion sensors based on laser-patterned composite polymer membranes (Lee et al.) 73

Ferrocene crown ethers
Synthesis, electrochemistry and complexation studies of ferrocene crown ethers (Ion et al.) 145
Film-modified electrodes
In situ FTIR studies on Prussian blue (PB)-, polyaniline (PAn)- and inner PB|outer PAn film-modified electrodes (Nakayama et al.) 125

Haloanthracene anion radicals
Rates of the halide ion cleavage from halo-9,10-diphenylanthracene anion radicals in DMF (Jaworski et al.) 163
pH effect
Influence of dopant, pH and potential on the spectral changes of poly(*o*-methoxyaniline): relationship with the redox processes (Gazotti Jr. et al.) 193

L-Histidine
Electrochemical regeneration of coenzyme NADH on a histidine modified silver electrode (Long, Chen) 239

Immobilisation
Protein electrochemistry at carbon nanotube electrodes (Davis et al.) 279
In situ AFM
Mechanism of solid|liquid interfacial reactions. The reactive dissolution of p-chloranil in aqueous solution as studied by the channel flow cell with electrochemical detection and atomic force microscopy (Booth et al.) 83
In situ FTIR
In situ FTIR studies on Prussian blue (PB)-, polyaniline (PAn)- and inner PB|outer PAn film-modified electrodes (Nakayama et al.) 125
In situ measurement
In situ study of the conductivity of the electrochemically deposited polyaniline film using a dual-disk microelectrode (Zhang et al.) 35
In situ UV–vis subtractive reflectance Spectroscopy
Spectroelectrochemical studies of poly-*o*-phenylenediamine. Part 2. In situ UV–vis subtractive reflectance spectroscopy (Wu et al.) 173
Ion transfer
Amperometric ion sensors based on laser-patterned composite polymer membranes (Lee et al.) 73
Iron-rich clay
Characterizations of iron-rich clay modified electrodes and their applications in optical recognition (Shyu, Wang) 27

Kinetic model
A kinetic model for the reduction of enzyme-generated H_2O_2 at a metal-dispersed conducting polymer film (Somasundrum et al.) 259
Kinetic parameters
The application of the concept of reaction layer to the study of electrode processes coupled with the second-order chemical reactions at microelectrodes under steady-state conditions (Zhuang, Sun) 103

Lead electrode
Effect of anions on the electrochemical behavior of Pb electrodes in alkaline solutions and on the anodic oxide film properties (Veluchamy, Minoura) 41

Mediated electrocatalysis
Mediated catalytic current for the oxidation of ethanol produced by *Acetobacter aceti* cells suspended in solution (Ikeda et al.) 265
Melinex
Amperometric ion sensors based on laser-patterned composite polymer membranes (Lee et al.) 73
Membrane-covered electrode
Analytical solution for the steady-state diffusion towards an inlaid disc microelectrode in a multi-layered medium (Galceran et al.) 1
Metal ions
Metal deposition near the tip of a scanning tunneling microscope (Divisek et al.) 169
Microelectrode
The application of the concept of reaction layer to the study of electrode processes coupled with the second-order chemical reactions at microelectrodes under steady-state conditions (Zhuang, Sun) 103
Modified electrodes
Characterizations of iron-rich clay modified electrodes and their applications in optical recognition (Shyu, Wang) 27
Monte Carlo simulation
Embedded atom method study of Cu deposition on Ag(111) (Del Pópolo, Leiva) 271
Multistep electrode processes
The application of the concept of reaction layer to the study of electrode processes coupled with the second-order chemical reactions at microelectrodes under steady-state conditions (Zhuang, Sun) 103

NAD^+/NADH
Electrochemical regeneration of coenzyme NADH on a histidine modified silver electrode (Long, Chen) 239
Nanotubes
Protein electrochemistry at carbon nanotube electrodes (Davis et al.) 279

Optical recognition
Characterizations of iron-rich clay modified electrodes and their applications in optical recognition (Shyu, Wang) 27
Oxides
Electrochemical deposition and properties of $PbO_2 + Co_3O_4$ composites (Musiani et al.) 131
Oxygen evolution reaction
Electrochemical deposition and properties of $PbO_2 + Co_3O_4$ composites (Musiani et al.) 131

Partial current density
Electrochemical reduction of CO_2 on single crystal electrodes of silver Ag(111), Ag(100) and Ag(110) (Hoshi et al.) 283
PbO films
Effect of anions on the electrochemical behavior of Pb electrodes in alkaline solutions and on the anodic oxide film properties (Veluchamy, Minoura) 41
Permeability
Analytical solution for the steady-state diffusion towards an inlaid disc microelectrode in a multi-layered medium (Galceran et al.) 1
Phenanthraquinone
Electrochemical scanning tunneling microscopy and electrochemical quartz crystal microbalance study of the adsorption of phenanthraquinone accompanied by an electrochemical redox reaction on the Au electrode (He et al.) 65
Phosphate
The kinetic study of specific adsorption of phosphate species on Pt(111) in acidic solutions (Fukuda, Aramata) 153
Phosphate adsorption/desorption
The kinetic study of specific adsorption of phosphate species on Pt(111) in acidic solutions (Fukuda, Aramata) 153
Photoelectrochemistry
Effect of anions on the electrochemical behavior of Pb electrodes in alkaline solutions and on the anodic oxide film properties (Veluchamy, Minoura) 41
Platinum
In situ FTIR studies on Prussian blue (PB)-, polyaniline (PAn)- and inner PB|outer PAn film-modified electrodes (Nakayama et al.) 125
Platinum electrodes
Electrochemical behaviour of oxocarbons on single crystal platinum electrodes. Part V. Tetrahydroxy-*p*-benzoquinone in 0.5 M sulphuric acid medium (Carbó et al.) 57
Polarography
Electrochemical behaviour and micromolar determination of the antineoplastic agent azaribine and its mixtures with cytidine (Marín et al.) 95
Polyaniline
In situ study of the conductivity of the electrochemically deposited polyaniline film using a dual-disk microelectrode (Zhang et al.) 35
In situ FTIR studies on Prussian blue (PB)-, polyaniline (PAn)- and inner PB|outer PAn film-modified electrodes (Nakayama et al.) 125
Polymerisation
Anodic oxidation of aniline and *N*-alkylanilines in aqueous sulphuric acid studied by electrochemical thermospray mass spectrometry (Stassen, Hambitzer) 219
Polymer membrane
Amperometric ion sensors based on laser-patterned composite polymer membranes (Lee et al.) 73
Poly(*o*-methoxyaniline)
Influence of dopant, pH and potential on the spectral changes of

poly(*o*-methoxyaniline): relationship with the redox processes (Gazotti Jr. et al.) 193
Poly-*o*-phenylenediamine
Spectroelectrochemical studies of poly-*o*-phenylenediamine. Part 2. In situ UV–vis subtractive reflectance spectroscopy (Wu et al.) 173
Polysulfides
Polysulfides in dimethylformamide: only the redox couples S_n^-/S_n^{2-} are involved (Levillain et al.) 243
Polyvinylchloride
Amperometric ion sensors based on laser-patterned composite polymer membranes (Lee et al.) 73
Protein
Protein electrochemistry at carbon nanotube electrodes (Davis et al.) 279
Prussian blue
In situ FTIR studies on Prussian blue (PB)-, polyaniline (PAn)- and inner PB|outer PAn film-modified electrodes (Nakayama et al.) 125
Prussian blue–polyaniline-modified electrodes
In situ infrared spectroscopic investigations on the electrochemical properties of Prussian blue–polyaniline-modified electrodes with various anionic Fe(II) complexes working as a mediator for the electroreduction of CO_2 (Nakayama et al.) 251

Quantitative analysis
Electrochemical behaviour and micromolar determination of the antineoplastic agent azaribine and its mixtures with cytidine (Marín et al.) 95
Quinone
Mediated catalytic current for the oxidation of ethanol produced by *Acetobacter aceti* cells suspended in solution (Ikeda et al.) 265

Rate constants
Rates of the halide ion cleavage from halo-9,10-diphenylanthracene anion radicals in DMF (Jaworski et al.) 163
Reaction mechanism
Spectroelectrochemical studies of poly-*o*-phenylenediamine. Part 2. In situ UV–vis subtractive reflectance spectroscopy (Wu et al.) 173
Redox couple
Polysulfides in dimethylformamide: only the redox couples S_n^-/S_n^{2-} are involved (Levillain et al.) 243
Reduction mechanism
Electrochemical behaviour and micromolar determination of the antineoplastic agent azaribine and its mixtures with cytidine (Marín et al.) 95
Reduction of CO_2
Electrochemical reduction of CO_2 on single crystal electrodes of silver Ag(111), Ag(100) and Ag(110) (Hoshi et al.) 283

Scanning tunneling microscope (STM)
Metal deposition near the tip of a scanning tunneling microscope (Divisek et al.) 169
Second-order reactions
The application of the concept of reaction layer to the study of electrode processes coupled with the second-order chemical reactions at microelectrodes under steady-state conditions (Zhuang, Sun) 103
Shielding effects
Metal deposition near the tip of a scanning tunneling microscope (Divisek et al.) 169
S_n^-/S_n^{2-}
Polysulfides in dimethylformamide: only the redox couples S_n^-/S_n^{2-} are involved (Levillain et al.) 243
Solid|liquid interface
Mechanism of solid|liquid interfacial reactions. The reactive dissolution of p-chloranil in aqueous solution as studied by the channel flow cell with electrochemical detection and atomic force microscopy (Booth et al.) 83
Spectroelectrochemistry
Influence of dopant, pH and potential on the spectral changes of poly(*o*-methoxyaniline): relationship with the redox processes (Gazotti Jr. et al.) 193
Static mercury drop electrode
Cyclic chronopotentiometry with non-linear current–time functions at an SMDEAmalgamation and reversibility effects and experimental verification (González et al.) 111
Steady-state diffusion
Analytical solution for the steady-state diffusion towards an inlaid disc microelectrode in a multi-layered medium (Galceran et al.) 1
Synthesis
Synthesis, electrochemistry and complexation studies of ferrocene crown ethers (Ion et al.) 145

Tetrahydroxy-*p*-benzoquinone
Electrochemical behaviour of oxocarbons on single crystal platinum electrodes. Part V. Tetrahydroxy-*p*-benzoquinone in 0.5 M sulphuric acid medium (Carbó et al.) 57
Thermospray mass spectrometry
Anodic oxidation of aniline and *N*-alkylanilines in aqueous sulphuric acid studied by electrochemical thermospray mass spectrometry (Stassen, Hambitzer) 219

Underpotential deposition
Embedded atom method study of Cu deposition on Ag(111) (Del Pópolo, Leiva) 271
UV spectrophotometry
Synthesis, electrochemistry and complexation studies of ferrocene crown ethers (Ion et al.) 145

Voltammetry
Synthesis, electrochemistry and complexation studies of ferrocene crown ethers (Ion et al.) 145
Voltammogram
Electrochemical reduction of CO_2 on single crystal electrodes of silver Ag(111), Ag(100) and Ag(110) (Hoshi et al.) 283

Wall jet disk electrode
Application of a wall jet disk electrode combined with an electrochemical quartz crystal microbalance to the study of the dissolution of copper in acidic chloride media (Itagaki et al.) 139

X-ray photoelectron spectroscopy (XPS)
XPS investigations of the electrochemical double layer on silver in alkaline chloride solutions (Hecht, Strehblow) 211
X-ray crystal structure
Synthesis, electrochemistry and complexation studies of ferrocene crown ethers (Ion et al.) 145